Training for the public's strongest safety advocate

Kevin Gregory, vessel traffic services manager, Port of London Authority, London, United Kingdom

The increased perception of a VTS

The role, functions and benefits of a vessel traffic service (VTS) have evolved and grown exponentially over recent years with the advent of new technologies and processes and, as such, VTS is now widely recognised as a powerful risk mitigation tool that can help make waterways safer and more efficient. Such evolution and growth can be readily evidenced by the wide and varied work of groups such as the International Association of Marine Aids to Navigation and Lighthouse Authorities (IALA) VTS committee, and the associated guidelines and recommendations produced that influence and shape the worldwide development of VTS.

Technology continues to be exploited with a range of high-tech and integrated sensors, systems and processes now available to support the core functions of a VTS. This has without doubt increased the capability of VTS Centres

worldwide taking them to a new level in their ability to plan, manage and monitor a diverse range of vessels in what is also a rapidly developing and changing shipping industry.

An example of such enhanced recognition as a powerful risk mitigation tool has been the increased public perception of a VTS. This has become steadily more apparent in recent years as the role of a VTS has become clearly defined. As such VTS is, and rightly so, being judged against the guidelines and recommendations specified by IALA and others. Perhaps one of the clearest examples of this was in the comments of Deborah A P Hersman, chairman of the US National Transportation Safety Board, who referred to the function of VTS as being "to protect the public interest by checking unsafe actions or unsafe operators" and further as a VTS being "the public's strongest safety advocate".

The increased role of the human

With this increased perception it is wholly reasonable that there is a focus on equipment and technology to assist a VTS in meeting its overarching goals. However, attention also has been paid to those people manning VTS centres worldwide. The Port of London Authority (PLA) operates one of the largest VTS areas in the UK covering some 600 square miles of waterway. Overseeing this is a team of 44 of which some 40 are, due to the nature of their role, trained to IALA recommendation V-103 (Standards for Training and Certification of VTS Personnel) as VTS professionals.

With a relatively large contingent of VTS professionals, the PLA developed its own programmes of VTS training and achieved IALA and MCA accreditation in 2011 and is currently approved to deliver IALA V-103/1 VTS operator training and MCA VTS refresher training.

The changing nature of the worldwide



Specialist training is provided for VTS personnel based at the Thames Barrier Navigation Centre

maritime industry has resulted in challenges to the well-established recruiting pathways. It is no longer guaranteed to be possible to recruit a new VTS operator (VTSO) from a traditional International Convention on Standards of Training, Certification and Watchkeeping for Seafarers (STCW) seagoing background. This makes the training process critical, particularly with a diverse range of learners as it is essential to meet the individual needs of each VTSO while providing a challenging learning experience for all members of the class.

Whilst it is essential for VTSOs from a non-seagoing background to attain an appropriate level of nautical knowledge, there are also benefits in recruiting such VTSOs. It could be suggested that while they would hold a level of nautical knowledge wholly relevant for their role, they would be free from some of the human-factor assumptions that inevitably exist in a hierarchical industry such as the seagoing sector. This, in many cases, results in the provision of VTSOs who are prepared to intervene and question vessels participating in a VTS area with little deference to rank or on board status which, it could be argued, further enhances the safety benefits of a VTS.

Theories and principles of learning

The emphasis of the training programmes is focussed primarily on the end result, being fully qualified, competent and professional VTS staff. This has been achieved through a process of extensive study in the theories and principles of learning and training development. It results in innovative training programmes that place the VTSO at the centre of all learning activity while embedding the core attributes of VTS professionals; commitment, courage, discipline, respect for others, integrity and loyalty.

To achieve this several overarching principles have been developed with regards to the development of VTSOcentred training. Wherever possible the sessions are related directly to real life VTS or maritime scenarios that the learners can readily relate to, the lessons are designed so as to be predominantly learner-led thereby fostering the sharing of professional knowledge and experience amongst the group. Importantly, the instructor acts as a facilitator leading and guiding the learners to bring their operational and professional experience to the forefront of the session.

Active learning

In practical terms, this has been applied through several key actions that form a part of each programme of training. Each course consists of a range of specialist lecturers providing valuable facilitation in their own specialist area. This includes direct input from harbour masters on matters such as policy and risk assessment, emergency and contingency planning specialists, corporate affairs officers covering media and public relations and VTS managers covering key traffic management, communication and personal attributes topics. All of this is supported by serving VTSOs and VTS supervisors who provide a valuable real-life context to support active classroom-based sessions.

All sessions are planned to be facilitative, resulting in the learners being very active participants through the completion of tasks and activities that turn the sessions into live interactive learning experiences as opposed to didactic, one-way, lecturer-led

lessons. This also has the added benefit of making the assessment process easier to achieve by means of continual monitoring of learners.

The ability to provide training in a live environment has been hugely beneficial. Sessions are mixed so as to include visits to the PLA's VTS centres to witness the live application of VTS technique; trips on the river to undertake and place into context risk assessment; and management exercises and the use of the PLA's full mission bridge simulator to provide a valuable and readily available insight into bridge operations in both routine and non-routine circumstances.

Putting it into practice

Simulation is a key element of all VTS training programmes. Simulation exercises are ideally placed to support and consolidate the interactive classroombased sessions. Simulation exercises vary in length but are generally most effective when they are relatively short in duration to focus on the selected learning points and key themes, thereby allowing VTSOs to maximise their simulation time.

Simulation exercises are usually best assessed by a process of peer review. The instructor should act as a facilitator, leading and guiding the VTSOs to bring their operational and professional experience to the simulation debrief. The VTSOs are actively encouraged to reflect on criteria such as: What went well? What did not go so well? What would you have done differently? This results in an active, dynamic, supportive and most importantly a secure learning environment where all outcomes are valuable for professional development.

Maintaining the standards

The UK has had a process of VTS refresher training for several years. Additionally, the IALA VTS committee are also developing a new model course covering refresher and revalidation training for VTSOs. The PLA approach to refresher training has embraced the concept of continual professional development. The refresher training programme itself includes review and analysis of lessons learned from VTS operations along with updates of regulatory, procedural and technological developments. Additionally, there are a series of focussed simulation exercises to embed new practices and ideas whilst actively reviewing the core principles contained in the existing IALA model

However, VTS training and development needs to be continuous. This can be easily achieved through activities such as trips on vessels with pilots or



Putting it into practice - simulation is a key component in the learning process

other stakeholders, visits to allied services, adjacent VTS centres or other similar organisations, as well as attendance and participation in relevant emergency or procedural exercises. This, while providing valuable development for VTSOs also enhances the outreach of VTS to users and others with whom VTS comes into contact with.

Towards the future

As the role, functions and strengths of VTS become more widely recognised there is a growing demand for high quality training. IALA have established the World Wide Academy which is the vehicle by which IALA delivers training and capacity building. The establishment of the World Wide Academy in itself points towards a growing demand for professional and credible training for VTS professionals whatever their background. The provision of high quality training and professional development is possibly the most critical building block of any VTS and likely the best means of ensuring the role of VTS is cemented as 'the public's strongest safety advocate' in demanding and busy waterways.

About the author



Kevin Gregory joined the PLA in 2003 as a VTS officer after a career in the merchant navy. Kevin joined VTS Management in 2007 and was appointed VTS manager in 2012. Kevin holds an honours degree in law and a post graduate diploma in teaching in the lifelong learning sector. Kevin is responsible for the strategic management of the PLA's

Vessel Traffic Service and associated training management system. Kevin is also the International Harbourmasters Association representative to the IALA VTS Committee.

About the organisation

The PLA ensures the safety of navigation on the River Thames and the associated estuary. The PLA also promotes the use of the port and the river whilst conserving the environment and working in partnership with river users and stakeholders. The PLA operates two VTS centres covering a diverse and challenging waterway along with a state of the art VTS training facility with IALA and MCA accreditation and approval to deliver V-103/1 VTS operator and VTS refresher training. The PLA will also, subject to course approval, offer V-103/2 VTS supervisor training from autumn 2013.

Enquiries

Kevin Gregory
Port of London Authority
London River House, Royal Pier Road, Gravesend, Kent, DA12 2BG, United Kingdom
Email: kevin.gregory@pla.co.uk
Tel: +44(0)1474 562299